

Amendments to the Claims

1-15. (Canceled)

16. (Currently amended) A method of screening for compounds that ~~increase~~ cause less loss of bone mineral density than a glucocorticoid, comprising the steps of:

- (a) contacting osteoblast and osteocyte cells ~~in-vivo~~ with either the [[a]] glucocorticoid or a test compound; and
- (b) comparing the number of said osteoblast and osteocyte cells undergoing apoptosis following treatment with said glucocorticoid to the number of said osteoblast and osteocyte cells undergoing apoptosis following treatment with said test compound, wherein a lower number of apoptotic cells following treatment with said test compound than with said glucocorticoid is indicative of a compound that increases causes less loss of bone mineral density than said glucocorticoid ~~in osteoporotic patients~~.

17. (Canceled.)

18. (Previously presented) The method of claim 16, wherein determination of said apoptosis is carried out using a technique selected from the group consisting of TUNEL, DNA fragmentation analysis, and immunohistochemical analysis.

19-23. (Canceled)

24. (Previously presented) The method of claim 16 wherein the contacting of step (a) is in vivo in a murine animal model.

25. (New) The method of claim 16 wherein the contacting of step (a) is in vitro in cell culture.

26. (New) The method of claim 16 wherein the contacting of step (a) is in vivo.

27. (New) The method of claim 16 wherein the test compound is a glucocorticoid analog.

28. (New) The method of claim 27, wherein said glucocorticoid analog retains anti-inflammatory properties, further comprising the step of: comparing the anti-inflammatory response of said glucocorticoid to the anti-inflammatory response of said test compound glucocorticoid analog, wherein essentially equivalent anti-inflammatory response of said glucocorticoid and said test compound glucocorticoid analog indicates that the glucocorticoid analog causes less loss of bone mineral density than said glucocorticoid while retaining anti-inflammatory properties.

29. (New) The method of claim 28, wherein said contacting is in an in vivo murine animal model.

30. (New) The method of claim 29, wherein said anti-inflammatory response is determined by models of inflammation selected from the group consisting of the adjuvant-induced arthritis model and hindlimb inflammation model.